



PANELMASTER HMI SOLUTIONS

Autech Control Group Pty Ltd is a product distributor specializing in electrical control and automation product solutions based in Melbourne, Australia.

Autech Control Group Pty Ltd is the authorized Australian distributor for the PanelMaster HMI products by Cermate Technologies Inc.



K/T/X/GX - Series

Autech Control Group Pty Ltd
A.B.N. 65 169 813 398
Unit 15, 104 Ferntree Gully Road,
Oakleigh, VIC, 3806, Australia
P. 03 9544 0733 F. 03 9544 0977
E. support@autotechcontrol.com.au
W. www.autotechcontrol.com.au



Autech Website

Cermate
A professional HMI solution provider

X-SERIES

Advanced HMI Panels

(For General Product Group)

Products Selection Guide

The X-series supports comprehensive LCD sizes ranging from 7" to 15" and are equipped with an ARM11 based CPU, 1G flash memory and 1MB battery backup memory. Its expansive communication interfaces; RS232/422/485, Ethernet, and USB port, with over 300 communication drivers allowing the X-series to connect easily with all types of equipment, such as motion/thermal controllers, inverters or sensors to name a few.

- 7"~15" TFT LCD screen size
- Wide temperature & high functionality
- BacNet, Ethernet IP, Video In



PX150-XSD-4/6



PX121-XSD-4/6



PX104-TST-4/6



PX070-WST-4/6

Size	15" (4:3)	12.1" (4:3)	10.4" (4:3)	7" (16:9)
Resolution	1024 x 768	1024 x 768	800 x 600	800 x 480
Working Memory	256 MB	256 MB	256 MB	256 MB
Built-in Storage Memory	1 GB	1 GB	1 GB	1 GB
Battery Backed RAM	1 MB	1 MB	1 MB	1 MB
COM1	RS232/422/485	RS232/422/485	RS232/422/485	RS232/422/485
COM2	A/B/C*	A/B/C*	A/B/C*	A/B/C*
COM3	RS232 or RS485	RS232 or RS485	RS232 or RS485	RS232 or RS485
USB	1 Client ; 1 Host			
Audio	Optional	Optional	Optional	Optional
Video	Optional	Optional	Optional	Optional
Real-Time Clock	Yes	Yes	Yes	Yes
Micro SD Slot	Yes	Yes	Yes	Yes

* A: RS422/485 B:RS232/485 C: RS232 with RTS&CTS



K-SERIES

Economy HMI Panels

(For General Product Group)

The K-series supports comprehensive LCD sizes ranging from 4.3" to 10.1" and are equipped with an ARM9 based CPU, 8M flash memory and 128KB battery backup memory. Its expansive communication interfaces; RS232/422/485, Ethernet, and USB port, with over 300 communication drivers allowing the K-series to connect easily with all types of equipments, such as motion/thermal controllers, inverters or sensors to name a few.

- 4.3"~ 10.1" wide screen TFT LCD size
- Suitable for simple & compact application
- Slim, cost effective



PK100-WST-20/40



PK070-WST-20/40



PK043-WST-10/30

Size	10.1" (16:9)	7" (16:9)	4.3" (16:9)
Resolution	1024 x 600	800 x 480	480 x 272
NOR Flash Memory	8 MB	8 MB	8 MB
NAND Flash Memory	128 MB	128 MB	-
Battery Backup Memory	128 KB*	128 KB*	128 KB*
USB	1 Client ; 1 Host	1 Client ; 1 Host	1 Client ; 1 Host
Function Key	Yes	Yes	-

* 1MB Battery Backed Memory Optional



T-SERIES

Products Selection Guide

Enhanced HMI Panels

(For General Product Group)

The T-series supports comprehensive LCD sizes ranging from 4.3" to 15.0" and are equipped with an ARM9 based CPU, 8M flash memory and 128KB battery backup memory. Its expansive communication interfaces; RS232/422/485, Ethernet, and USB port, with over 300 communication drivers allowing the T-series to connect easily with all types of equipments, such as motion/thermal controllers, inverters or sensors to name a few.

- 4.3"~15" TFT LCD screen size
- Meets General Machinery Application
- RTC; Flash memory; Historical Data Record; Alarm Data Recode

The T-series is equipped with a high resolution TFT LCD contains 65536 colors and LED back light, which gives the display brighter look, and is more clear for highly precise operations. To confront the severe environment setting of some factories, the T-series complies with IP66 and allows for an operating temperature -10~60°C.

Moreover, Cermate also provides some options for customers to shape their own HMI tailored to their needs. For example, an aluminum front case is suited for those who prefer a more fashionable design or to operate the HMI under more harsh environment; NAND flash and micro SD provide extending the capacity of HMI; different COM port options provide additional flexibility for customers.

All those features bundle with our easy-to-use programming software, PM Designer, provides you perfect automation solutions.



PT150-XSD



PT104-TST



PT100-WST



PT080-TST



PT070-WST



PT043-WST



PT043-WSK

Size	15" (4:3)	10.4" (4:3)	10.1" (16:9)
Resolution	1024 x 768	800 x 600	1024 x 600
NOR Flash Memory	8 MB	8 MB	8 MB
NAND Flash Memory	128 MB*	128 MB*	128 MB*
Battery Backup Memory	128 KB**	128 KB**	128 KB**
COM1	RS232/422/485	RS232/422/485	RS232/422/485
COM2	A/B/C***	A/B/C***	A/B/C***
COM3	RS232 or RS485	RS232 or RS485	RS232 or RS485
USB	1 Client ; 1 Host	1 Client ; 1 Host	1 Client ; 1 Host
Real-Time Clock	Yes	Yes	Yes
Front Function Key	-	-	6 (Optional)
Front USB	-	Yes (Optional)	Yes (Optional)
Micro SD	Yes	Yes	Yes

* 128MB NAND Flash only for sub-number 2 and 4

** 1 MB optional

*** A: RS422/485 B:RS232/485 C: RS232 with RTS&CTS

Size	8" (4:3)	7" (16:9)	4.3" (16:9)	4.3" (16:9)
Resolution	800 x 600	800 x 480	480 x 272	480 x 272
NOR Flash Memory	8 MB	8 MB	8 MB	8 MB
NAND Flash Memory	128 MB*	128 MB*	128 MB*	-
Battery Backup Memory	128 KB**	128 KB**	128 KB**	128 KB**
COM1	RS232/422/485	RS232/422/485	RS232/422/485	RS232/422/485
COM2	A/B/C***	A/B/C***	A/B/C***	A/B/C***
COM3	RS232 or RS485	RS232 or RS485	RS232 or RS485	RS232 or RS485
USB	1 Client ; 1 Host			
Real-Time Clock	Yes	Yes	Yes	Yes
Front Function Key	6 (Optional)	6 (Optional)	-	23
Front USB	Yes (Optional)	Yes (Optional)	-	-
Micro SD	Yes	Yes	Yes	Yes

* 128MB NAND Flash only for sub-number 2 and 4

** 1 MB optional

*** A: RS422/485 B:RS232/485 C: RS232 with RTS&CTS



GX-SERIES Products Selection Guide

(For General Product Group)

The GX series is a WinCE based HMI with an LCD size ranging from 7" to 15". GX is also equipped with 256MB working memory and 1GB of storage memory, that will provide a high performance operation. All the series uses a high resolution color TFT LCD with LED back light to ensure a clear display and a longer backlight life. The ultra slim design is fashionable and easily-mounted. The design is not only stylish, but made of a robust structure enabling the GX series to be used in any stringent environment.

- WinCE OS, 2D Graphic Engine; Real-Time Data Memory

The rich communication interface of the GX series, includes; 3 COM ports, Ethernet and 2 USB ports (1client, 1host), which can provide an easy connection with other devices. The GX is also customizable for your specific needs, so that we can accommodate your unique requirements. Here are some customized options: aluminum front case, audio function and micro SD or NAND flash. The GX series is what Cermate presents for open HMI users who desire for high performance products.



Size	15" (4:3)	12.1" (4:3)	10.4" (4:3)
Resolution	1024 x 768	1024 x 768	800 x 600
Working Memory	256 MB	256 MB	256 MB
Built-in Storage Memory	1 GB*	1 GB*	1 GB*
Battery Backed RAM	1 MB	1 MB	1 MB
COM1	RS232/422/485	RS232/422/485	RS232/422/485
COM2	A/B/C**	A/B/C**	A/B/C**
COM3	RS232 or RS485	RS232 or RS485	RS232 or RS485
USB	1 Client ; 1 Host	1 Client ; 1 Host	1 Client ; 1 Host
Audio	Yes (optional)	Yes (optional)	Yes (optional)
Video	-	-	-
Real-Time Clock	Yes	Yes	Yes
Micro SD	Yes	Yes	Yes

Size	10.1" (16:9)	8" (4:3)	7" (16:9)
Resolution	1024 x 600	800 x 600	800 x 480
Working Memory	256 MB	256 MB	256 MB
Built-in Storage Memory	1 GB*	1 GB*	1 GB*
Battery Backed RAM	1 MB	1 MB	1 MB
COM1	RS232/422/485	RS232/422/485	RS232/422/485
COM2	A/B/C**	A/B/C**	A/B/C**
COM3	RS232 or RS485	RS232 or RS485	RS232 or RS485
USB	1 Client ; 1 Host	1 Client ; 1 Host	1 Client ; 1 Host
Audio	Yes (optional)	Yes (optional)	Yes (optional)
Video	-	-	-
Real-Time Clock	Yes	Yes	Yes
Micro SD	Yes	Yes	Yes

* 64MB: WinCE OS, 1GB~64MB: User

** A: RS422/485 B:RS232/485 C: RS232 with RTS&CTS

* 64MB: WinCE OS, 1GB~64MB: User

** A: RS422/485 B:RS232/485 C: RS232 with RTS&CTS



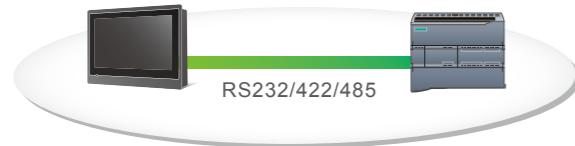
Hardware Feature—Communication

General Description

You can use serial port or ethernet to complete different type of communications. You can communicate with 1 or multiple devices direct or indirect.

Various Communication Links

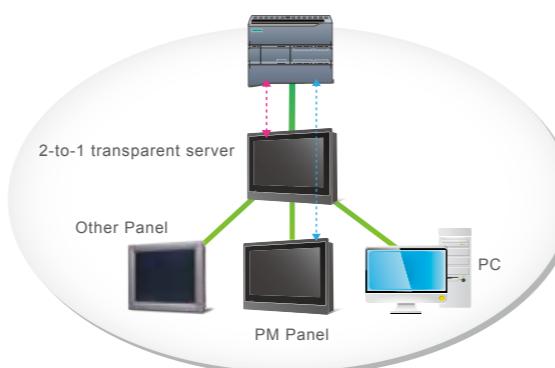
► Direct Link



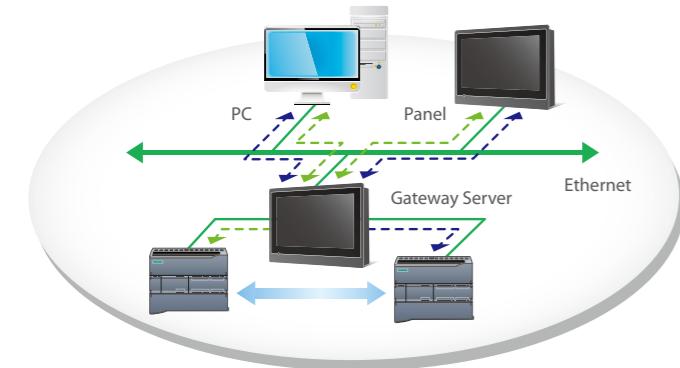
► 2 to 1 connection



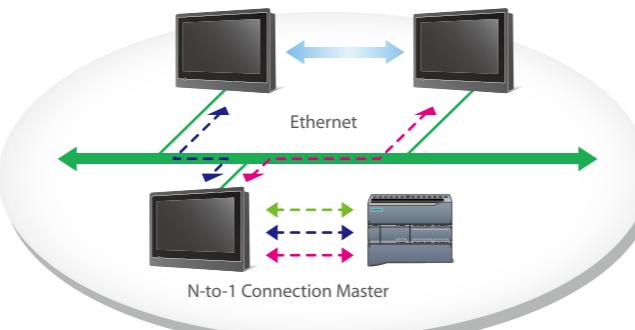
► 2 to 1 transparent connection



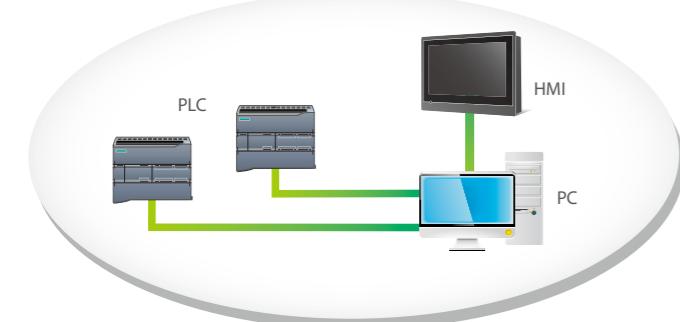
► Gateway Service



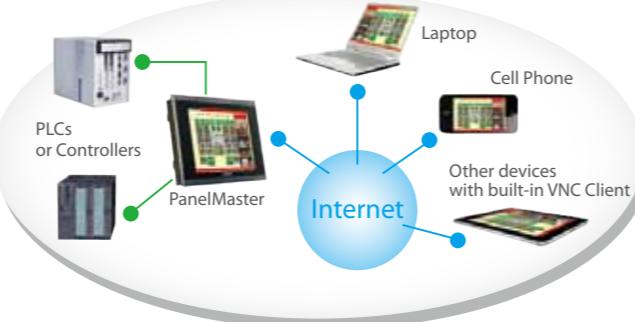
► N-to-1 Communication



► OPC



► VNC



Hardware Feature—

We will provide total HMI solution for different various application of automation field



Application Fields

Building Automation

In building automation, the HMI provides an economic and an easy answer for those who need integrated and systematic solutions. Elevators, power system management, AC and alarm systems can be integrated into a more intelligent product solution. You can manage, supervise and record more easily than you've ever experienced before.

Remote Control

Factory Automation

The HMI is booming in the Factory Automation field. With a more accessible price, friendly operations and wide range of selection, successful applications are seen everywhere in our daily life. The automation system for a manufacturing process will provide a more stable output and save you time and expense.

Machine Automation

In the scope of industrialization, automation is required to provide an efficient and precise way of manufacturing. Machine automation can provide operators assistance with physical work, and greatly decrease the need for human sensory as well as mental fatigue. In a production line of machines, the HMI takes the helm of the automation process and helps you manage the whole system from top down.



HMI Development Software - PM Designer



PM Designer is proven in many application fields and is an easy to use integrated development tool featuring solution-oriented screen objects, high-end vector graphics, Windows fonts for multi-language applications, recipes, alarms, data loggers and operation logging. PM Designer also includes online/offline simulation and other utility programs such as Data Transfer Helper (DTH); recipes editors and text editors. PanelMaster runtime, a part of PM Designer, guarantees reliability and performance because of the minimum system overhead, high communication data rates, sub-second screen switching, and 24/7 operation.

Software Features

- Allows users to switch multi-language UI dynamically, with Unicode and multilingual screen text supported.
- Provides password protection of designs, macros and upload/download operations.
- Allows to download the runtime data using serial port, Ethernet, USB and Micro SD card.
- Allows the use of USB memory sticks for trouble-free application updates.
- Provides index registers for modifying device addresses at runtime.
- Operation log helps the review and investigation of important events.
- Supports over 380 industrial communication protocols, such as SIMATIC S7-1200, BACNet MSTP/BACNet IP, and more.

Shortcut & Execution Toolbar

Icon Display Improves Work Efficiency

- Shortcut icons designed to show objects, figure type, and operations improving work efficiency.
- Frequently used objects and figures can be registered as Favorites.

Project Workspace

An Intuitive Tree Display Makes Runtime Development Easy

- Easy to create, develop, and manage project property efficiency by project-based management worksheets.

Screen Design Worksheet

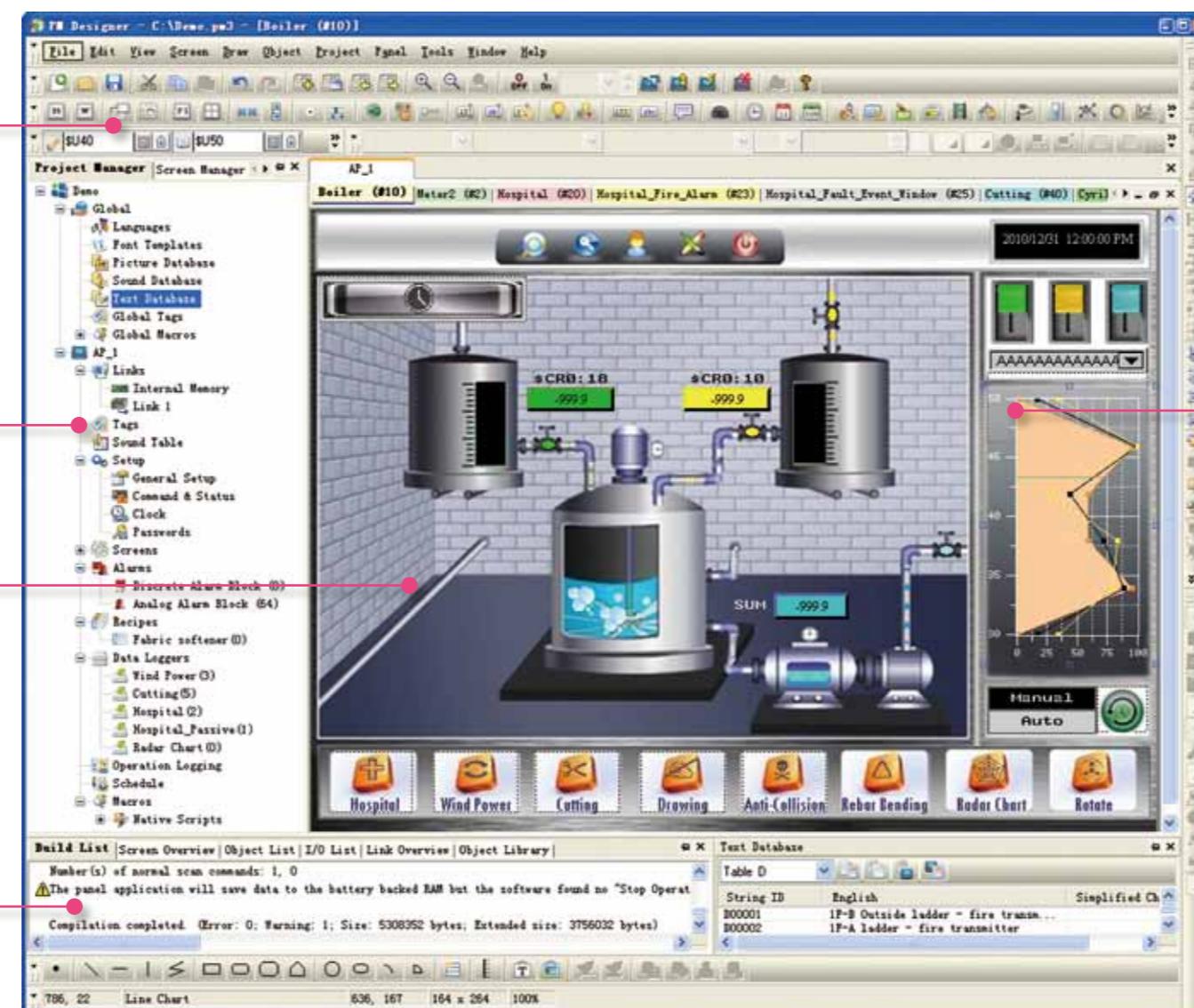
Smart Screen Design

- Easy to view screens during runtime development, adjustable based on user-oriented application.

Message Build List

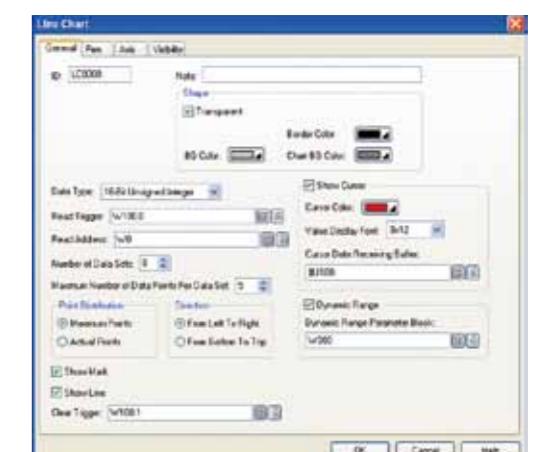
Compile & Simulate Results

- By double clicking on the error message after compilation it will automatically jump to the place where the problem is.



Dialog Box

- The property dialog is displayed by double-clicking the object or figure.
- Figure changes are immediately reflected on screen, thereby simplifying the process and reducing setting errors.
- Easy to set the properties through pop-up dialog box.

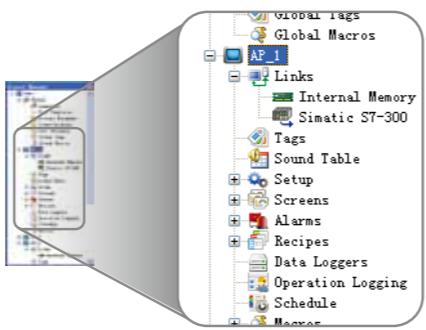


PM Designer Software

► Efficient Project-based Structure to Manage Multiple Applications

Powerful integrated development studio

- One project can have many applications.
- The project tree provides all you need to manage a project.
- Global settings and resources sharable to all applications in a project.
- You can make the most out of existing projects by import/export functions for all kinds of settings.
- Containing entire project in one file makes the maintenance job easy.



► Software Functionalities to Satisfy Various Needs

Possible to achieve a mini-SCADA system

- 10 sets of languages and 20 fonts for each language (TrueType fonts supported)
- 4 communication links with the option to add more RS-485 and TCP/IP sub-links.
- 1 startup macro; 1 main macro; 4 event macros, 4 time macros, no limitation on other kinds of macros
- 64 discrete and 64 analog alarm blocks, 16 recipe blocks and 16 data loggers.
- 1 operation logger, 80 schedules, 7999 screens.



► User Friendly Tools to Make Customized Designs Easier and More Efficient

Intuitive screen editor and toolbars

- Real-time WYSIWYG allows you to see the change of object appearance at any time.
- Property dialogs with semi-transparent features will not block your view to screen objects anymore.
- Overlapped objects' properties can be changed by double-clicking the top object.
- Automatic size adjustment of characters and pictures according to the object size is supported.
- Groups a number of objects to move, resize, and modify the common attributes.
- Rotate a picture or change its tone to fit the need of an object.



► Top-down approach for planning and complete understanding of the application

Centralized configuration tools

Screen Manager – A tool for configuration and management of multiple screens

Screen Overview - Organizing Application Screens in a Graphical Way

Link Overview - A graphical tool for defining the communication configuration project wise

Object Library - Sharing the User-defined Objects

Object List - Displaying all the objects with associated I/O points of a screen in a list

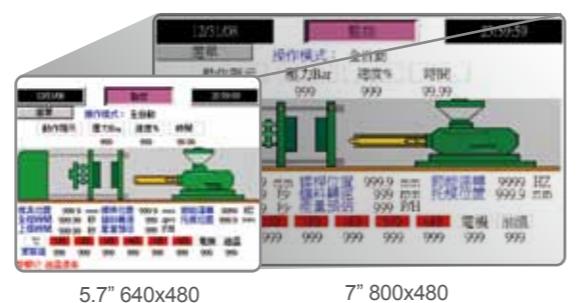
I/O List - Showing all the I/O points with their purposes of an application in a table



► Changing HMI Model Can Be Done in Seconds

Automatic size adjustment

- When changing the screen resolution, all the screen objects are automatically resized to maintain the relative positions and size ratios to the original screens.
- The screen orientation at run time can be predefined in landscape and portrait



► Thousands of Professional Pictures are provided to Beautify Your Screens

Picture libraries and picture database

- Famous industrial pictures from Symbol Factory are ready for use.
- Manufacturer made pictures are ideal for your buttons, lamps, and symbols.
- You can make your own picture libraries.
- The types of importable picture files include: BMP, JPG(JPEG), GIF, WMF, SVG(Scalable Vector Graphics) and PNG.

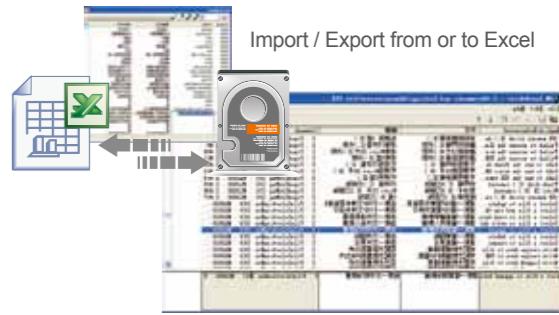


PanelMaster symbols (.BMP)

► Simple Text Mapping Table Fulfils the Needs for Multiple Languages

Text database and text editor

- Text database, a collection of text tables, contains editable strings for all supported languages in the project. It supports import/export texts in MS Excel.
- Text Editor, a convenient tool for preparing and reusing text among projects, can edit all screen texts in multi-languages.



Import / Export from or to Excel

► Secure Intellectual Properties

Design Protection

- Project files, screens, macros, and password tables can be protected by different passwords.
- Copying and uploading of an application can be prohibited in advance.
- Automatically recovers data from damaged or unsaved file
- The developer password of a project or a PRP password is required to transfer an application to a HMI.



► Multilanguage Enabled UI and Applications

Multilanguage

- You can display the user interface (UI) in different languages.
- You can develop multi-language application in at most 10 languages.
- You can enter an ASCII or Western European or Cyrillic or simplified Chinese string for a variable using a character entry at runtime.



► Plenty of Solution-oriented Screen Objects

Objects

Provides more than 70 different kinds of objects for common HMI needs, animation, sophisticated functions or industrial specific.



Parisn Programmer

G Code Editor

► Supplementing and Extending Configuration for More Advanced Use Cases

Advanced Object settings

- Showing readable or precise information according to dynamic data range, scale range, and time range settings
- Displaying qualified records in alarm display and historic data table according to the query conditions.



PM Designer Software

► Provides Complete Recipe Handling Functions

Recipe blocks

- Support up to 16 different groups of recipes.
- Transfer of recipes between PanelMaster and PLCs/files is supported.
- With Recipe Editor you can edit recipes on a PC.
- Many screen objects support recipe data.



► Versatile Alarm Monitoring and Display Capabilities

Alarm processing

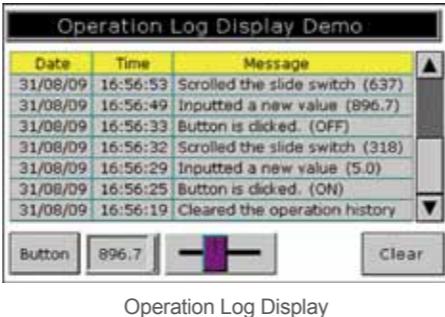
- Up to 64 discrete alarm blocks and 64 analog alarm blocks can be monitored and recorded.
- Up to 8 data values can be read and recorded along with an alarm event.
- A global alarm marquee is supported.
- Saving the logged alarms to a file is supported.



► Operations Can Be Recorded for Improving Quality and Efficiency

Operation logging

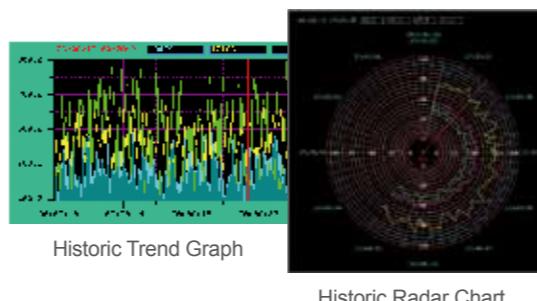
- The starting time and the stopping time of an application can be recorded.
- The failure of a communication link can be recorded.
- Operation Log Display lists the logged operations process for the operator to review



► Easy to configure data collections and historic data displays

Data loggers

- Can collect data from up to 16 different data sources.
- Data collection can be activated according to a set time or a trigger bit.
- You can save/load collected to/from a file by a function button or macro program.
- Use data logging macro to log processed data instead of original data.
- Use passive data logger to receive data from the primary data logger or a file



► Performing a specified operation at the designated time

Schedule

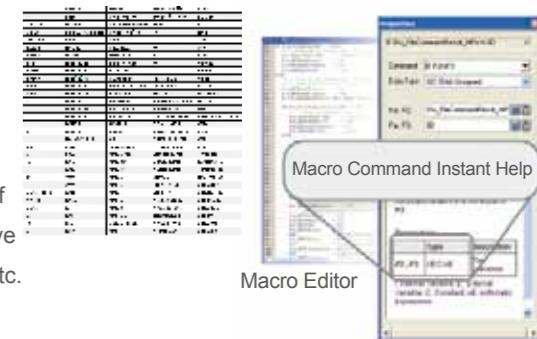
- Each schedule can be programmed to either change the value of a specified PLC location or execute a specified macro at the designated time
- Up to 80 schedules can be registered in a panel application
- Enable or disable power- on action or end action
- Operator can use Schedule setting table to modify pre-defined schedule at runtime.

ID	Name	Status	Set	Start Time	End Time	Applied Days
1	Temp A	■	010000	21:00:00	00:00:00	MON
2	Motor B	■	020000	21:00:00	00:00:00	TUE
3	Temp C	■	030000	17:00:00	00:00:00	WED
4	Temp D	■	040000	17:00:00	00:00:00	THU
5	MaxTemp	■	050000	21:30:00	00:00:00	FRI
6	Start Check	■	060000	00:00:00	21:00:00	SAT

► Easy-to-use Script Editor and Commands

Script editor and native script commands

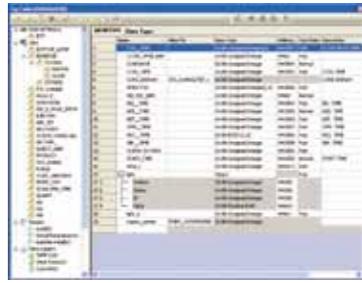
- Easily compose native scripts for HMI using useful and reliable script commands with simple syntax and convenient instant help messages
- Scripts are useful for operations not supported in standard object or feature of PM Designer, such as sequential operations, conditional operations, interactive operations, file operations, data exchange between two connected devices, etc.
- Possible to implement simple communication driver.



► Offering cross-user consistency, navigation efficiency and compliance

Tag Management

- By changing tags, you can use any PLC or controller without re-developing the application.
- You can define a tag or an array tag or a structure tag to represent an address or a memory block for the application.
- Tags can be added, renamed, deleted, imported and exported, etc.



► Checking, integrating, and optimizing an application intelligently

Compiler

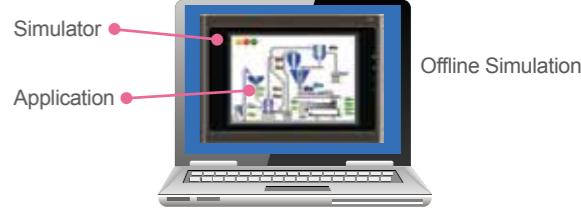
- Checks the correctness and consistency of all the settings and designs.
- Optimizes the communications with connected devices.
- Translates macros into compact and ready-to-execute codes.
- Builds runtime data to be executed by the HMI.



► Reduce Time and Effort to Boost Performance through Advanced Simulations

Offline simulation and online simulation

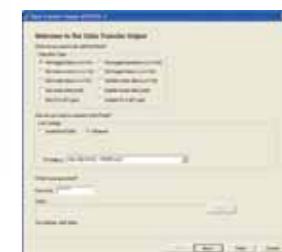
- Offline simulation function can help to experience your design result even before decide to purchase this model.
- Evaluates the communication performance using online simulation before installation.



► Provides Various Choices for Application Runtime Data Transfers

Data Transfer Tool & Data Transfer Helper (DTH)

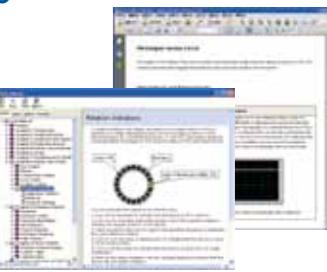
- Uses PM Designer or DTH to transfer an application's runtime data to a PanelMaster through a serial port, an Ethernet port, or a USB port anytime when that PanelMaster is running. (Some PanelMaster models may not have a client USB port to support the data transfer.)
- Without a PC, transfers an application's runtime data to a PanelMaster by using an USB memory stick or Micro SD card.



► Providing all the necessary documents for the developers using the software

Help and Release Notes

- Use the search interface to return all documents that match any specified term or set of terms.
- Browse the table of contents which including reference documentation, sample codes, technical articles and more. It is in HTML format and contains over 500 topics and 1000 pictures.
- Use index to jump to some of the most popular functions or features of the software.
- Browse the changes or enhancement made to the features of the software.



Specification of X-Series



Model Name	PX150-XSD	PX121-XSD	PX104-TST	PX070-WST	
Display	Sub-models	4 / 6	4 / 6	4 / 6	
	Size	15" diagonal	12.1" diagonal	10.4" diagonal	
	Max. Resolution	1024*768	1024*768	800*600	
	Type	TFT LCD with LED Backlight			
	Max. Colors	16-bit/24-bit (Software selectable)			
	Backlight Life (hr)	50000	50000	20000	
	Display Contrast	700	700	400	
	Luminance (cd/m2)	350	600	400	
	Touch Screen	5-wire Analog Resistive Type		4-wire Analog Resistive Type	
	CPU	RISC ARM11 800MHz			
Communication Interface	Battery Backup RAM	1MB			
	Working Memory	256MB			
	NAND Flash ROM	1GB (SLC Type)			
	Real-Time Clock (RTC)	Yes			
	Micro-SD Slot	YES(SDHC)			
	USB Client	YES(USB 2.0)			
	USB Host	YES(USB 1.1)			
	COM1 / COM3	COM1: RS232/422/485, COM3: RS232 or RS485			
	COM2	COM2: A-RS422/485 B-RS232/485 C-RS232 with RTS&CTS			
	Ethernet	YES			
Environment	Front Function Keys	N/A			
	Audio	6: YES			
	Video in	6: YES, Module Depth: 20mm			
	Front USB Host Port	N/A	N/A	YES (1.1)	YES (1.1)
	Supply Voltage	24VDC±10% Isolated			
	Consumption	20W	20W	15W	13W
	Operating Temperature	-20°C~60°C(-25°C~75°C optional with AL front, CE certified only)			
	Relative Humidity	10%~90%			
	Shock (operation)	10~55Hz(X,Y,Z direction, 1G, 30 Mins shock testing)			
	EMI	FCC Part 15 Class A			
Power	CE	EN61000-6-2, EN61000-6-4			
	UL Certification	YES			
	Ingress Protection	IP66			
	Cooling	Natural Cooling			
	Dimension WxHxD	399.1 x 297.6 x 55	317.4 x 243.8 x 58	280.3 x 222.3 x 45	213.6 x 158.6 x 40.5
	Cutout Dimension AxB	384.5 x 283.0	301.5 x 228.0	259.5 x 201.5	192.0 x 138.5
	Net Weight	2.68Kg	1.9Kg	1.25Kg	0.8Kg



Specification of K-Series



Model Name	PK100-WST	PK070-WST	PK043-WST	
Display	Sub-models	20 / 40	20 / 40	10 / 30
	Size	10.1" diagonal	7.0" diagonal	4.3" diagonal
	Max. Resolution	1024*600	800*480	480*272
	Type	TFT LCD with LED Backlight		
	Max. Colors	16-bit		
	Backlight Life (hr)	20000		
	Display Contrast	500	500	500
	Luminance (cd/m2)	200	280	250
	Touch Panel	4 Wire Analog Touch Panel		
	CPU	RISC ARM9 32Bit		
Communication Interface	Backup SRAM	128KB		
	Working Memory	32MB		
	Built-in Storage Memory	8MB+128MB (NAND Flash)		
	Real-Time Clock (RTC)	YES		
	Micro-SD Slot	N/A		
	USB Client	YES(USB 1.1)		
	USB Host	YES(USB 1.1)		
	COM1 / COM3	COM1: RS232/RS422/RS485, COM3: RS232 or RS485		
	COM2	N/A		
	Ethernet	4: YES	4: YES	3: YES
Environment	Front Function Keys	N/A		
	Audio (optional)	N/A		
	Video (optional)	N/A		
	Front USB Host Port	N/A		
	Supply Voltage	24VDC±10% Isolated		
	Consumption	20W	15W	6W
	Operating Temperature	0°C~50°C		
	Relative Humidity	10%~90%		
	Shock (operation)	10 ~ 55Hz(X,Y,Z direction, 1G, 30 Mins shock testing)		
	EMI	FCC Part 15 Class A		
Power	CE	EN61000-6-2, EN61000-6-4		
	UL Certification	N/A		
	Ingress Protection	IP65		
	Cooling	Natural Cooling		
	Dimension WxHxD	270.1 x 212.1 x 42.5mm	203.5 x 149.0 x 33mm	130.0 x 106.2 x 39mm
	Cutout Dimension AxB	259.5 x 201.5mm	192.0 x 138.5mm	119.0 x 93.0mm
	Net Weight	1.1Kg	0.65Kg	0.35Kg



Specification of T-Series



Model Name	PT150-XSD	PT104-TST	PT100-WST			
Display	Sub-models	4	1 / 2 / 4	1 / 2 / 4		
	Size	15" diagonal	10.4" diagonal	10.1" diagonal		
	Max. Resolution	1024*768	800*600	1024*600		
	Type	TFT LCD with LED Backlight				
	Max. Colors	16-bit				
	Backlight Life (hr)	50000	20000			
	Display Contrast	700	400	500		
	Luminance (cd/m2)	350	400	200		
	Operation	5-wire Analog Resistive Type	4 wires analog resistive			
	CPU	RISC ARM9 32Bit				
Communication Interface	Backup SRAM	128KB (Optional: 1MB)				
	Working Memory	64MB				
	Built-in Storage Memory	1: 8MB, 2 / 4: 8MB+128MB (NAND Flash)				
	Real-Time Clock(RTC)	Yes				
	Micro-SD Slot	YES	2/4: YES	2/4: YES		
	USB Client	YES(USB 1.1)				
Power	USB Host	YES(USB 1.1)				
	COM1 / COM3	COM1: RS232/422/485; COM3: RS232 or 485				
	COM2	COM2: A-RS422/485 B-RS232/485 C-RS232 with RTS&CTS				
	Ethernet	4: YES				
	Front Function Keys	N/A	N/A	6-keys (optional)		
	Audio (optional)	N/A				
Environment	Video (optional)	N/A				
	Front USB Host Port	N/A				
	Supply Voltage	24VDC±10% Isolated				
	Consumption	25W	20W	20W		
	Operating Temperature	-10°C~60°C				
	Relative Humidity	10%~90%				
	Shock (operation)	10 ~ 55Hz(X,Y,Z direction, 1G, 30 Mins shock testing)				
	EMI	FCC Part 15 Class A				
	CE	EN61000-6-2, EN61000-6-4				
	UL Certification	Yes				
Ingress Protection	Ingress Protection	IP66				
	Cooling	Natural Cooling				
	Dimension WxHxD	399.1 x 297.6 x 55mm	270.1 x 212.1 x 42.5mm	270.1 x 212.1 x 42.5mm		
	Cutout Dimension AxB	384.5 x 283.0mm	259.5 x 201.5mm	259.5 x 201.5mm		
	Net Weight	2.68Kg	1.2Kg	1.2Kg		



Model Name	PT080-TST	PT070-WST	PT043-WST	PT043-WSK
Display	Sub-models	1 / 2 / 4	1 / 2 / 4	1 / 2 / 4
	Size	8" diagonal	7" diagonal	4.3" diagonal
	Max. Resolution	800*600	800*480	480*272
	Type	TFT LCD with LED Backlight		
	Max. Colors	16-bit		
	Backlight Life (hr)	20000		
	Display Contrast	500	500	500
	Luminance (cd/m2)	250	300	250
	Operation	4 wires analog resistive		
	CPU	RISC ARM9 32Bit		
Communication Interface	Backup SRAM	128KB (Optional: 1MB)		
	Working Memory	64MB		
	Built-in Storage Memory	1: 8MB, 2/4: 8MB+128MB (NAND Flash)		
	Real-Time Clock(RTC)	Yes		
	Micro-SD Slot	2/4: YES		
	USB Client	YES(USB 1.1)		
Power	USB Host	YES(USB 1.1)		
	COM1 / COM3	COM1: RS232/422/485; COM3: RS232 or 485		
	COM2	COM2: A-RS422/485 B-RS232/485 C-RS232 with RTS&CTS		
	Ethernet	4: YES		
	Front Function Keys	6-keys (optional)	6-keys (optional)	N/A
	Audio(optional)	N/A		
Environment	Video (optional)	N/A		
	Front USB Host Port	N/A		
	Supply Voltage	24VDC±10% Isolated		
	Consumption	20W	15W	6W
	Operating Temperature	-10°C~60°C		
	Relative Humidity	10%~90%		
	Shock (operation)	10 ~ 55Hz(X,Y,Z direction, 1G, 30 Mins shock testing)		
	EMI	FCC Part 15 Class A		
	CE	EN61000-6-2, EN61000-6-4		
	UL Certification	Yes		
Ingress Protection	Ingress Protection	IP66		
	Cooling	Natural Cooling		
	Dimension WxHxD	231.5 x 174.5 x 42.5	188.0 x 143.3 x 36.0	130.0 x 106.2 x 39
	Cutout Dimension AxB	221.0 x 164.0	175.0 x 132.5	119.0 x 93.0
	Net Weight	0.93Kg	0.6Kg	0.35Kg



Specification of GX-Series



Model Name	GX615-XSD	GX612-XSD	GX610-TST		
Sub-models	4	4	4		
Display	Size	15" diagonal	12.1" diagonal		
	Max. Resolution	1024*768	1024*768		
	Type	TFT LCD with LED Backlight			
	Max. Colors	16-bit			
	Backlight Life (hr)	50000	20000		
	Display Contrast	700	400		
	Luminance (cd/m ²)	350	400		
Touch Panel	5 wires analog resistive		4 wires analog resistive		
CPU	RISC ARM11 800MHz				
Backup SRAM	1MB				
Working Memory	256MB				
Built-in Storage Memory	1GB (64MB:Win CE OS)				
Real-Time Clock(RTC)	YES				
Communication Interface	Micro-SD Slot	YES			
	USB Client	YES(USB 2.0)			
	USB Host	YES(USB 1.1)			
	COM1 / COM3	COM1: RS232/RS422/RS485; COM3: RS232 or RS485			
	COM2	COM2: A-RS422/485 B-RS232/485 C-RS232 with RTS&CTS			
	Ethernet	YES			
Front Function Keys	N/A				
Audio (optional)	YES				
Video (optional)	N/A				
Front USB Host Port	N/A				
Power	Supply Voltage	24VDC±10% Isolated			
	Consumption	25W	25W		
	Operating Temperature	-20°C~60°C(-25°C~75°C optional with AL front,CE certified only)			
	Relative Humidity	10%~90%			
	Shock (operation)	10 ~ 55Hz(X,Y,Z direction, 1G, 30 Mins shock testing)			
	EMI	FCC Part 15 Class A			
	CE	EN61000-6-2, EN61000-6-4			
Environment	UL Certification	YES			
	Ingress Protection	IP66			
	Cooling	Natural Cooling			
	Dimension WxHxD	399.1 x 297.6 x 55mm	317.4 x 243.8 x 58mm		
	Cutout Dimension AxB	384.5 x 283.0mm	301.5 x 228.0mm		
	Net Weight	2.68Kg	1.9Kg		
		2.12Kg	1.25Kg		



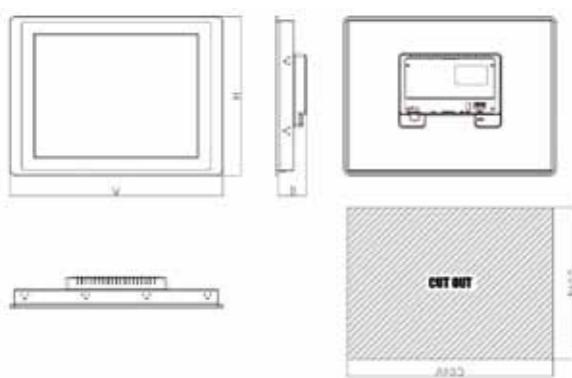
Model Name	GX611-WST	GX608-TST	GX607-WST
Display	Sub-models	4	4
	Size	10.1" diagonal	8" diagonal
	Max. Resolution	1024*600	800*600
	Type	TFT LCD with LED Backlight	
	Max. Colors	16-bit	
	Backlight Life (hr)	20000	
	Display Contrast	500	500
Communication Interface	Luminance (cd/m ²)	250	250
	Touch Panel	4 wires analog resistive	
	CPU	RISC ARM11 800MHz	
	Backup SRAM	1MB	
	Working Memory	256MB	
	Built-in Storage Memory	1GB (64MB:Win CE OS)	
Power	Real-Time Clock(RTC)	YES	
	Micro-SD Slot	YES	
	USB Client	YES(USB 2.0)	
	USB Host	YES(USB 1.1)	
	COM1 / COM3	COM1: RS232/RS422/RS485; COM3: RS232 or RS485	
	COM2	COM2: A-RS422/485 B-RS232/485 C-RS232 with RTS&CTS	
Environment	Ethernet	YES	
	Front Function Keys	N/A	
	Audio (optional)	YES	
	Video (optional)	N/A	
	Front USB Host Port	N/A	
	Supply Voltage	24VDC±10% Isolated	
	Consumption	15W	13W
Power	Operating Temperature	-20°C~60°C(-25°C~75°C optional with AL front,CE certified only)	
	Relative Humidity	10%~90%	
	Shock (operation)	10 ~ 55Hz(X,Y,Z direction, 1G, 30 Mins shock testing)	
	EMI	FCC Part 15 Class A	
	CE	EN61000-6-2, EN61000-6-4	
	UL Certification	YES	
	Ingress Protection	IP66	
Power	Cooling	Natural Cooling	
	Dimension WxHxD	280.3 x 222.3 x 45mm	241.6 x 184.6 x 46mm
	Cutout Dimension AxB	259.5 x 201.5mm	221.0 x 164.0mm
	Net Weight	1.25Kg	1.1Kg



Cutout

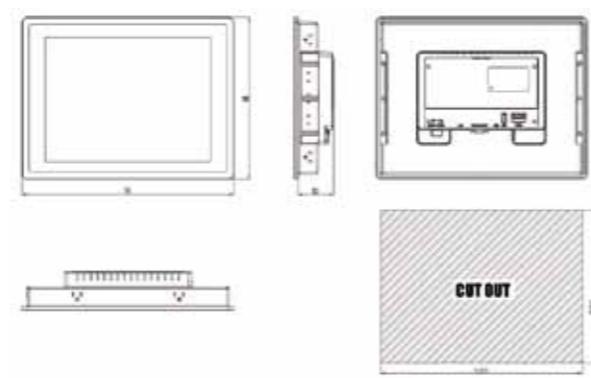
PT150-XSD / PX150-XSD / GX615-XSD

Dimension WxH 399.1 x 297.6mm
Cutout Dimension AxB 384.5 x 283.0mm



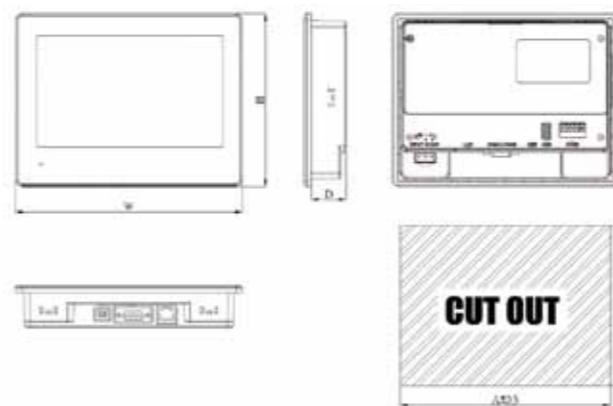
PX121-XSD / GX612-XSD

Dimension WxH 317.4 x 243.8mm
Cutout Dimension AxB 301.5 x 228.0mm



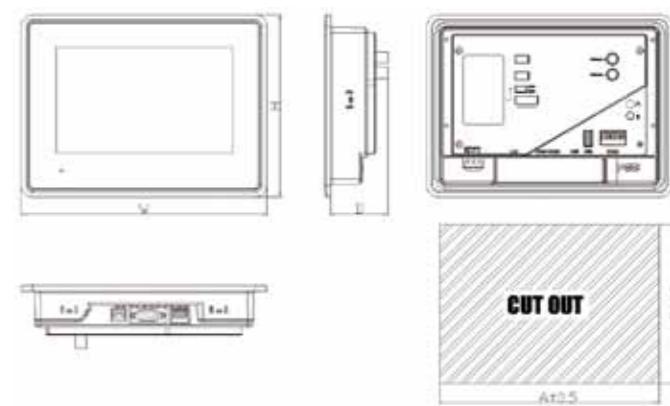
PT070-WST

Dimension WxH 188.0 x 143.3mm
Cutout Dimension AxB 175.0 x 132.5mm



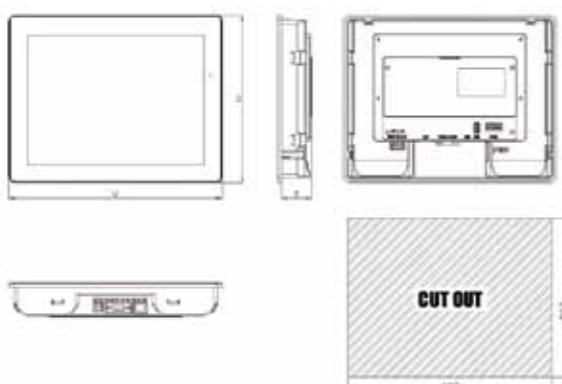
PX070-WST / GX607-WST

Dimension WxH 213.6 x 158.6mm
Cutout Dimension AxB 192.0 x 138.5mm



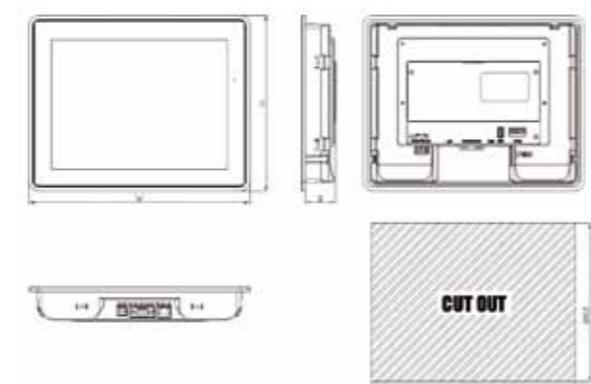
PT104-TST / PT100-WST

Dimension WxH 270.1 x 212.1mm
Cutout Dimension AxB 259.5 x 201.5mm



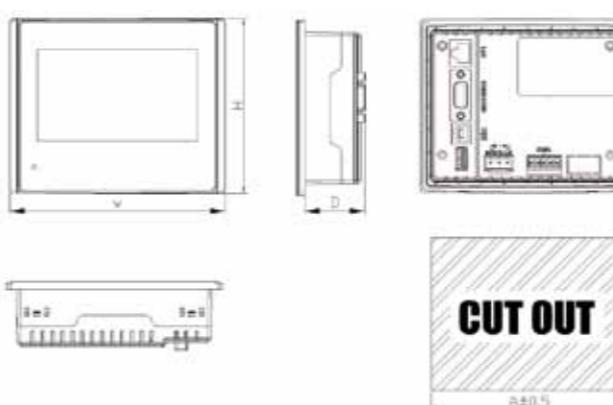
PX104-TST / GX610-TST / GX610-WST

Dimension WxH 280.3 x 222.3mm
Cutout Dimension AxB 259.5 x 201.5mm



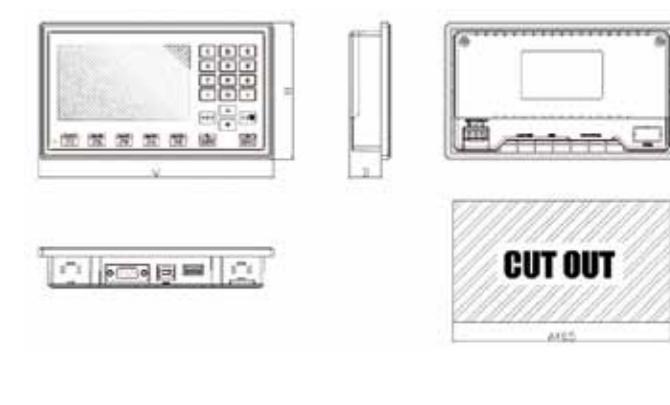
PT043-WST

Dimension WxH 130.0 x 106.2mm
Cutout Dimension AxB 119.0 x 93.0mm



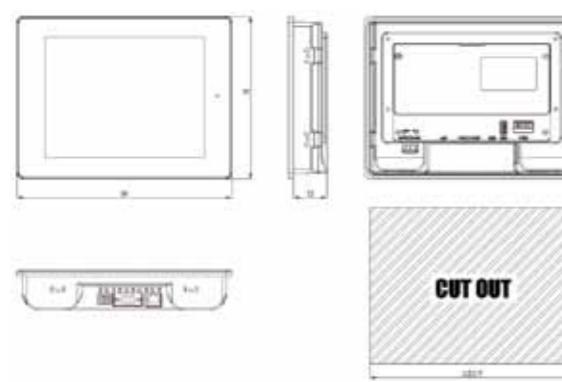
PT043-WSK

Dimension WxH 172.0 x 102.0mm
Cutout Dimension AxB 160.5 x 89.5mm



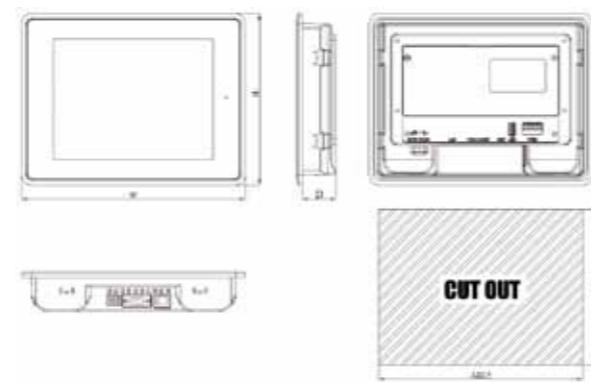
PT080-TST

Dimension WxH 231.5 x 174.5mm
Cutout Dimension AxB 221.0 x 164.0mm



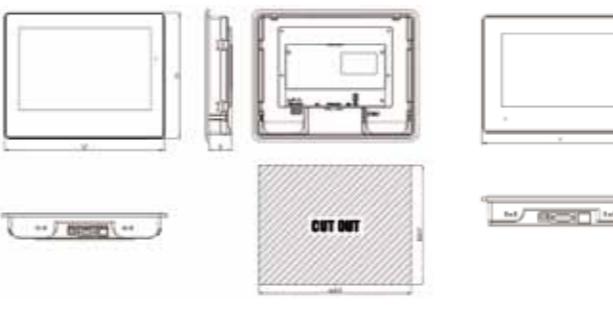
GX608-TST

Dimension WxH 241.6 x 184.6mm
Cutout Dimension AxB 221.0 x 164.0mm



PK100

Dimension WxH 270.1 x 212.1mm
Cutout Dimension AxB 259.5 x 201.5mm



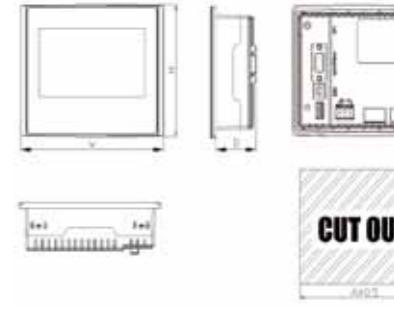
PK070

Dimension WxH 203.5 x 149.0mm
Cutout Dimension AxB 192.0 x 138.5mm



PK043

Dimension WxH 130.0 x 106.2mm
Cutout Dimension AxB 119.0 x 93.0mm





Driver List

Communication Port (COM) Applicable PLC Controllers

Brand	Model
ABIDO Automation Co., Ltd.	AD-4401 Weighing Indicator ACR420 984 Device/Slave (RTU)
Adlee Powertronic Co. Ltd.	MS/AP/AS Series Inverter (RTU) BL/D305 Series (RTU)
Advantech	Null PLC
AIGO Technologies Corporation	ADAM (Modbus RTU) ADAM-4000 (ASCII)
Allen Bradley	SE500 Series (Modbus RTU) Micrologix 1000/1500 SLC 5/03, 5/04 DH-485 (COM) PLC-5
ARICO Technology	CompactLogix/ControlLogix Tag FC Type(Modbus)
Astraada HMI	Modbus Master (RTU) Modbus Device/Slave (RTU)
Automation Technology Co., Ltd.	Modicon Device/Slave (RTU, Quantum)
Banner Engineering Int'l Inc.	Modbus Master (RTU; Non-volatile slave data)
CAPAC	BLDC NLV/KLV Series
CHINO Corporation	BSP01 Series
CMZ Sistemi Elettronici	TC
CTB Technologies Corporation	DB1000 Digital Indicating Controller (ASCII)
Danfoss Group	NFO Controllers
DEIF A/S	FCT Controllers SD Drivers SDS Drivers MDM Drivers
Delta Corporation	IMS Servo Controller VLT 2800 Series (FC Protocol)
Dirise Electric Technology Co.,Ltd.	Modbus RTU (COM port)
Emerson Network Power	WSS/WSS-L
Epson Corporate	DVP-ES/SS/EP/EH DVP-ES/SS/EP/EH (No block read)
Eura Drivers Electric Corp.	DVP-SV(RTU)
Fatek Automation Corp.	VFD-M Inverter (ASCII)
Festo Corporation	VFD-B Inverter (ASCII)
Fuji Electric Corporation	DTC1000/2000 Temperature (ASCII)
FVK Automation Co., Ltd.	DTA Temperature (ASCII)
GE Corporation	ASDA-A Servo Controller (ASCII)
Gigarise Technology Co., Ltd.	ASDA-B Servo Controller (ASCII)
GOFAST Corporation	ASDA-A2 Servo Controller (ASCII)
Haiwell Technology Co., Ltd	DRS2000 Series Inverter
Hanbell Precise Machinery Co., Ltd.	DRS2800 M Series Inverter
Hitachi Industrial Equipment Systems Co., Ltd	EC Series (RTU)
Hitech	EV1000 Series Variable Speed Driver
Holip Electronic Technology Co.,Ltd.	Epson LQ Matrix Printer
	Eura EF1S/1N
	Eura EF2N
	Eura Inverter (Modbus RTU)
	Eura Inverter (Modbus ASCII)
	FATEK FBs/FBe
	FPC/FEC Series
	NB Series
	PXR Series Temperature (RTU)
	FRENIC-VP (RTU)
	FRENIC5000G11/P11 (Fuji)
	FRENIC-Mini/Eco/Multi/Mega(RTU)
	F Series Inverter
	90 Series SNP
	VersaMax Series (SNP)
	90 and RX3i Series (SNP)
	90 Series CCM
	SE5000
	GA400 Temperature (RTU)
	NC Series
	HW Series (RTU)
	Air Screw Compressor
	SJ200 Inverter
	H/EH Series
	EHV Series (Procedure 1)
	H-252C
	AD Series Servo Drives
	Computer as Slave (COM)
	Computer as Master (COM)
	Computer as Slave V2 (COM)
	Computer as Master V2 (COM)
	HLP-C+/CP

Brand	Model
Honeywell	BACnet/MSTP BACnet
Hunjoen Electronic Co., Ltd.	Modbus Device/Slave (RTU, 255) Modbus Device/Slave (RTU, 255, NoBlock)
IECCO	H_Tech PID CONTROLLER
Inovance Control Technology Co., Ltd.	Sinus Penta Inverter (RTU)
Integrated Flow Systems	H2u (CPU Port)
JETTER	MD Series Inverter (RTU-1) IS Servo (RTU)
Keyence Corp.	iPurge Source Controller NANO Series JetControl 24x Series
Klockner Moeller Corporation	KV Series KV-1000 KV-L20, KV-NANO
Koyo Electric Corp.	KV-L20 KV-3000
Lenze Drive Systems GmbH	PS4-201-MM1 SUCONET K
LG Industrial Systems	K Sequence Series Direct Logic Series Direct 06 Series (K Sequence) Direct 06 Series (DirectNET) 93xx Servo Controllers (LECOM A/B)
LG System	Master-K Series CNet K120S CPU Port Master-K Loader GLOFA GM Series CNet
Liyan Electric Industrial Ltd.	XBM-DR16S GLOFA GM Loader
Lust Antriebstechnik GmbH	XEC/XGI CNet XGT/XGK (CPU) XGL-C22A
Matsushita Electric Works	LGA Series(as Slave) LGA Series (as Master)
Maxtech	EX Series (CPU Port)
Mean Well Enterprises Co., Ltd.	LustBus ServoC/CDE Series
Micro Trend Corporation	LustBus CDD Series
Mirle Automation Corporation	FP Series Computer Link
Mitsubishi Electric Corp.	VF0C Series Inverter VF100 Series Inverter
Modicon Corp.	MC2 PID Controller
Omron Corporation	MC 5738 (RTU)
Pan-Globe Corp.	PRETA
PanelMaster	MC Series (RTU)
Parker Hannifin	UTC Servo Controller
RICH Electric Co., LTD.	rDX Controller
RKC Instrument Inc.	Melsec-FX (CPU Port)
Saia Burgess	Melsec-Q/QnA (Link Port)
Samwon Technology	Melsec-Q00/01 (CPU Port)
Schneider Electric	Melsec-Q02 (CPU Port)
Shinko Technos Co., Ltd.	Melsec-Q02U (CPU Port)
Siemens AG	Melsec-Q00J (CPU Port)
Tai'an Automation Co.,Ltd.	Melsec-FX2n (CPU Port)
Taiwan Instrument & Control Co., Ltd.	Melsec-FX3U (CPU Port)
Teco Electric & Machinery Co.,Ltd.	Melsec-FX3U (Link Port)
Mitsubishi Electric Corp.	Melsec-An/AnS (Link Port)
Modicon Corp.	Melsec-An/AnS Protocol 4
Omron Corporation	FX2n-10GM/20GM
Panasonic Corporation	Melsec-A1S/A2S (CPU Port)
PanelMaster	FR-E500 Series (485)
PORIS	Melsec-A3N/A1SH (CPU Port)
Saia Burgess	Melsec-An/AnU (Link Port)
Siemens AG	Melsec-An/AnU Protocol 4
Siemens AG	Servo Amplifier MR-J2S-A
TPM	Servo Amplifier MR-J3-A
Vware	Servo Amplifier MR-J4-A
WAGO Kontakttechnik GmbH & Co. KG	Melsec-A2A/A2AS (CPU Port)
Yaskawa Corporation	Melsec-Q06H (CPU Port)
Yokogawa Electric Corporation	Melsec-Q12H (CPU Port)
	Melsec-Q03U (CPU Port)
	Melsec-Q00U (CPU Port)
	GOT-F900 Emulator (1:1 Format 1 & 2)
	Melsec-Q01U (CPU Port)
	EV Linear Gage Counter (ASCII)
	Modicon 984 Master (RTU)
	Modicon 984 Master (RTU; Little Memory)

Brand	Model
Modicon Corp.	Modicon 984 Device/Slave (RTU)
Newtop Co., Ltd.	Modbus Master (ASCII) Modbus Master (ASCII; Little Memory) Modbus Device/Slave (ASCII) Modicon Device/Slave (RTU, Quantum)
Omron Corporation	TSX Premium (Uni-Telway) TSX Quantum (Uni-Telway)
Pan-Globe Corp.	Twido (Modbus RTU)
Panasonic Corporation	Modbus Master (RTU; Non-volatile slave data) Modbus Master (ASCII; Non-volatile slave data)
PanelMaster	PSTC (Temperature Controller)
Parker Hannifin	PSBD (Brushless Driver)
RICH Electric Co., LTD.	PSSD (Stepping Driver)
RKC Instrument Inc.	PSMC (Motion Controller)
Saia Burgess	PSMC (Motion Controller)
Samwon Technology	PSMC (Motion Controller)
Schneider Electric	PSMC (Motion Controller)
Shinko Technos Co., Ltd.	PSMC (Motion Controller)
Siemens AG	ATV31 Inverter (RTU)
Tai'an Automation Co.,Ltd.	Lexium 23 Servo Controller (ASCII)
Taiwan Instrument & Control Co., Ltd.	CPT-20A MODBUS DEVICE/SLAVE (ASCII)
Teco Electric & Machinery Co.,Ltd.	JCS-33A-R/M (Shinko Protocol)
Mitsubishi Electric Corp.	JCS-33A-R/M (Modbus ASCII)
Modicon Corp.	Simatic S7-200 (PPI; 1-to-1)
Omron Corporation	Simatic S7-200 (PPI; Network)
Panasonic Corporation	Simatic S7-300 (MPI Port)
PanelMaster	Simatic S7-300 (PC Adaptor)
PORIS	Simatic S5 3964R
Saia Burgess	TP03 Series (Modbus RTU)
Siemens AG	TP02 Series
Taiwan Instrument & Control Co., Ltd.	TAIE FY100/900 Series (RTU)
Teco Electric & Machinery Co.,Ltd.	TAIE FY100/900 Series (TAIE)
TOHO Electronics Inc.	FY series DIGITAL PID CONTROLLER
	TSDA Series AC Servo
	TP03 Series (Modbus RTU)
	TP02 Series
	TSTA Series AC Servo
	TTX-700 (Modbus RTU)
	TTM-000 Series (TOHO Protocol)
	TTM-200 Series (TOHO Protocol)

Brand	Model
Tokyo Keiso	UCM-04A
Vigor Corporation	M/VB Series
Yamatake Corporation	SDC35/36 Temperature (RTU) SDC35/36 Temperature (ASCII)
Yi Li Electric Machinery Co., Ltd.	MA500 FA Controller (ECL Host)
Yokogawa Electric Corporation	DMC10 Controller (RTU)
Yudian Automation Technology Ltd.	DMC10 Controller (ASCII)
Zhuhai Motion Control Motor Co., Ltd.	MX30
	MX50
	Σ-II SGDM/H Series AC Servo
	MP Series Controller (Memobus)
	V7 inverter (Memobus)
	NS600 Servo Controller
	YPV Servo Controller
	YJD Servo Controller
	FA-M3 Series (CPU Port)
	AI-7048 (Aibus)
	AI518/ 708/ 808/ 518P/ 708P/ 808P Controller (Albus)
	BP Series PSDA driver (RTU)

Communication Port (Ethernet)

Brand	Model
Advantech	BACnet/IP
Allen Bradley	BAS BACnet/IP
Astraada HMI	ADAM-4000 (ASCII)
CMZ Sistemi Elettronici	ADAM-6000 (ModBus TCP/IP)
DEIF A/S	MicroLogix 1000/1500 via 1761-NET-ENI
EasyIO	CompactLogix/ControlLogix Ethernet/IP Tag
Fatek Automation Corp.	ModBus Master (TCP/IP)
GE Corporation	ModBus Device/Slave (TCP/IP)
Hitachi Industrial Equipment Systems Co., Ltd	ModBus Master (TCP/IP)
Honeywell	ModBus Device/Slave (TCP/IP)
JETTER	ModBus Master (TCP/IP; Type 2)
Lenze Drive Systems GmbH	ModBus Device/Slave (TCP/IP; Type 2)
Mirle Automation Corporation	FCT Controllers(TCP/IP; Type 2)
Q Ethernet	TCP/IP Modbus (Ethernet port)
RICOH	EasyIO-30 (RTU)
SRTP Ethernet	Fatek FBs/FBe (TCP)
SRTP Ethernet (Micro)	SRTP Ethernet (Micro)
Hitachi Industrial Equipment Systems Co., Ltd	EH/EHV Series (Ethernet; TCP)
Honeywell	EH/EHV Series (Ethernet; UDP)
Panasonic Corporation	BACnet/IP
Parker Hannifin	Epson Matrix Printer
PanelMaster	PC Series PLC Module
Parker Hannifin	Barcode Scanner
Panasonic Corporation	FP Series
Panasonic Corporation	MINAS A4 Series
Panasonic Corporation	Null PLC
Panasonic Corporation	General Device (COM)
Panasonic Corporation	Data Sharer (RS485)
Panasonic Corporation	Modbus Master (RTU)
Panasonic Corporation	Modbus Master (RTU; Little Memory)
Panasonic Corporation	Modbus Master (RTU; Non-volatile slave data)
Panasonic Corporation	Modbus Device/Slave (RTU)
Panasonic Corporation	Modbus Device/Slave (RTU, 16Words)
Panasonic Corporation	Modbus Device/Slave (Word order in big-endian)
Panasonic Corporation	Modbus Device/Slave (RTU; no block read)
Panasonic Corporation	Modbus Device/Slave (RTU, 30Words)
Panasonic Corporation	Modbus Device/Slave (ASCII)
Panasonic Corporation	Modbus Device/Slave (ASCII; no block read)
Panasonic Corporation	Barcode Scanner
Panasonic Corporation	Epson Matrix Printer
Panasonic Corporation	PC Series PLC Module
Panasonic Corporation	Compax3
Panasonic Corporation	EI-500 Series (RTU)
Panasonic Corporation	EI-9001 Series (RTU)
Panasonic Corporation	MA900/CB900 Series (RTU)
Panasonic Corporation	CD/CH Series (ASCII)
Panasonic Corporation	PCD Series (S-Bus PGU)
Panasonic Corporation	PCD Series (S-Bus, Data Mode)
Panasonic Corporation	NOVA Series (RTU)
Panasonic Corporation	NOVA Series
Panasonic Corporation	ATV31 Inverter (RTU)
Panasonic Corporation	Lexium 23 Servo Controller (ASCII)
Panasonic Corporation	CPT-20A MODBUS DEVICE/SLAVE (ASCII)
Panasonic Corporation	JCS-33A-R/M (Shinko Protocol)
Panasonic Corporation	JCS-33A-R/M (Modbus ASCII)
Panasonic Corporation	Simatic S7-200 (PPI; 1-to-1)
Panasonic Corporation	Simatic S7-200 (PPI; Network)
Panasonic Corporation	Simatic S7-300 (MPI Port)
Panasonic Corporation	Simatic S7-300 (PC Adaptor)
Panasonic Corporation	Simatic S5 3964R
Panasonic Corporation	Simatic S5
Panasonic Corporation	TP03 Series (Modbus RTU)
Panasonic Corporation	TP02 Series
Panasonic Corporation	TAIE FY100/900 Series (RTU)
Panasonic Corporation	TAIE FY100/900 Series (TAIE)
Panasonic Corporation	FY series DIGITAL PID CONTROLLER
Panasonic Corporation	TSDA Series AC Servo
Panasonic Corporation	TP03 Series (Modbus RTU)
Panasonic Corporation	TP02 Series

Accessories & Others

Cable	FCB-FE0-009	2m Download Cable	Cable for FATEK	Cable for Mitsubishi FX	Cable for Panasonic FP	USB Download Cable	UR25	UR43
		D-sub 9 pins (male) 	Connection 2 → 2 3 → 3 5 → 5	D-sub 9 pins (female) 				
		D-sub 9 pins (male) 	Connection 2 → 1 3 → 2 5 → 4	FBs 4 pins (male) 				
		D-sub 9 pins (male) 	Connection 1 → 1 4 → 2 6 → 4 9 → 7	FX 8 pins (male) 				
		D-sub 9 pins (male) 	Connection 2 → 1 3 → 2 5 → 3	FP 5 pins (male) 				
		Type A 	USB-RS232/422/485	Type B 	1. Jumper Selection 2. USB interface 3. D-SUB 25M interface 4. D-SUB 09M interface			
						1. UR43-232M9-B1L20C01—USB to Cermate HMI cable 2. UR43-422R8-B1L20M01—USB to Mitsubishi PLC cable 3. UR43-485M9-B1L20S01—USB to Siemens PLC PPI cable		

Others	HPB-CER-001/002	HMB-CER-017	HMB-CER-018	HMB-CER-022
	001: RS422/485 002: RS232/485 	RS232(COM1/3) 	RS422/485(COM1) RS232(COM1&COM3) 	RS422/485(COM1) RS232(COM1&COM3)

Screen Protector	P2M-WD0-406 (Suitable for 3.5" / 4.3" / 5.6" / 5.8") P2M-ET0-022 (Suitable for 7.0" / 8.0") P2M-ET0-023 (Suitable for 10.1" / 10.4" / 12.1") P2M-ET0-024 (Suitable for 15")

PANEL EXPRESS

Designed for Convenience

PanelExpress is a Windows based HMI runtime. It enables you to utilize the resources of a PC, such as computation power, multimedia, and bigger screen, to realize a high-end sophisticated HMI. Its configuration software, PM Designer, is also the development tool for K/T/X-Series RTOS based HMI products. Thanks to the cross platform flexibility offered by PM Designer, switching hardware for performance becomes an easy job.



General Features

- Cost effective Windows based HMI runtime
- Over 50 of screen objects can fulfill all types of HMI operating and viewing needs for machine automation
- Supports 16 communication links for different application
- No limitation on the internal I/O points used in an application
- Supports over 350 PLC communication protocols
- Supports data collection, alarm monitoring, recipe handling, and history of operation logging
- Provides a complete set of useful macro commands. Macro programs can be embedded in objects, screens, and the global process

Advanced Features

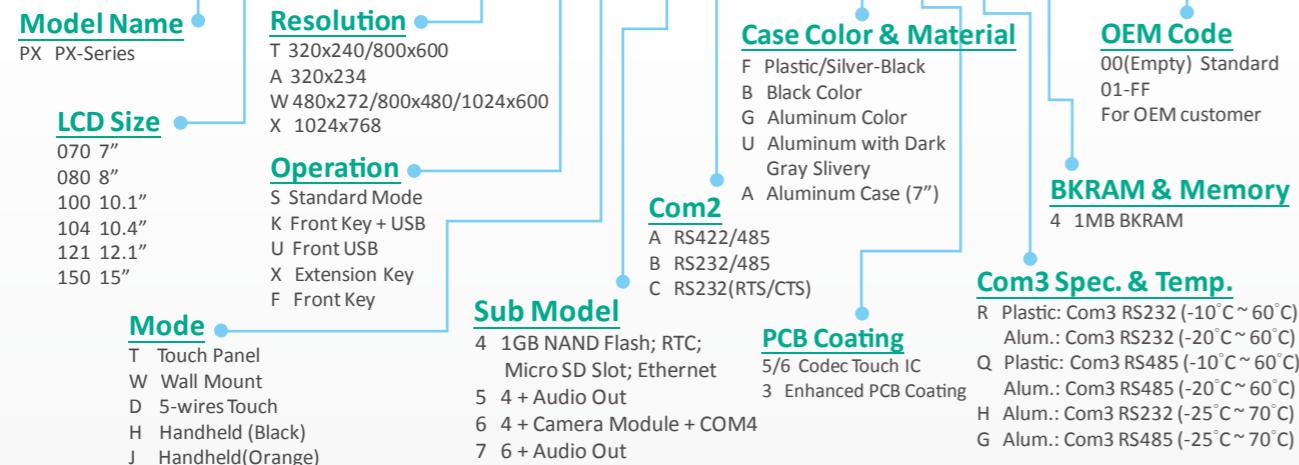
- Number of communication links can be up to 128
- Monitors up to 64 discrete alarm blocks and 64 analog alarm blocks.
Up to 65535 alarms can be defined



Ordering Information

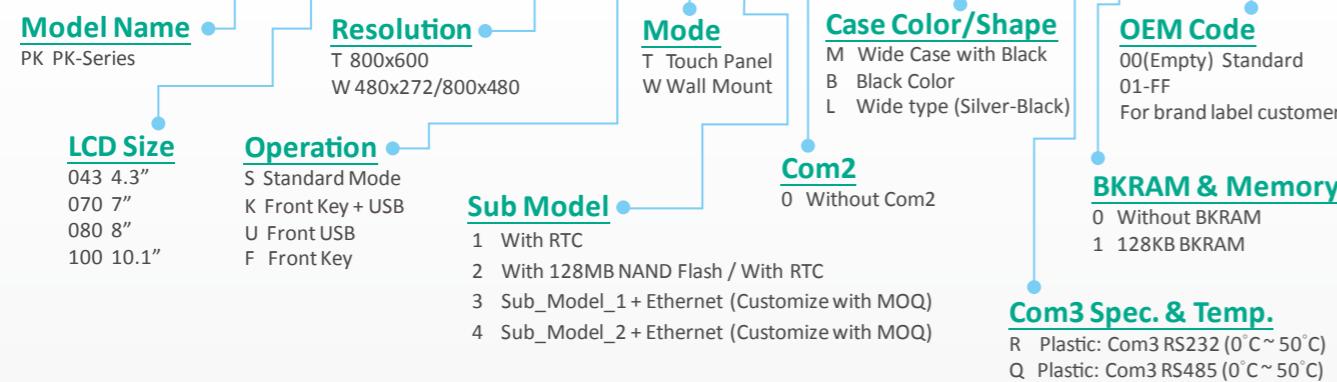
X-Series

PX 070 - W S T 4 B - U 6 R 4 C00



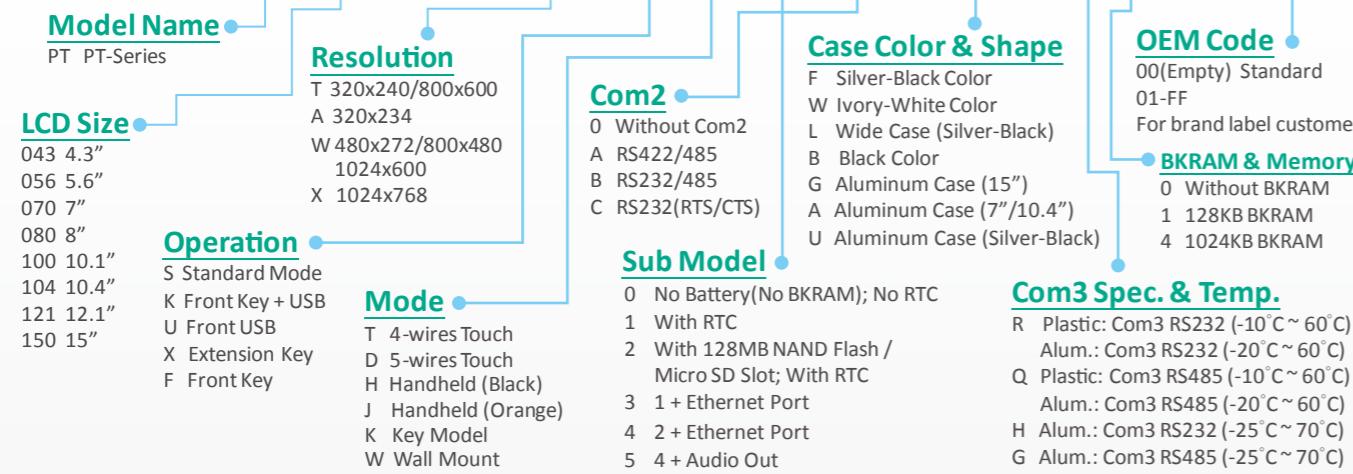
K-Series

PK 070 - W S T 2 0 - M1 R1 C00



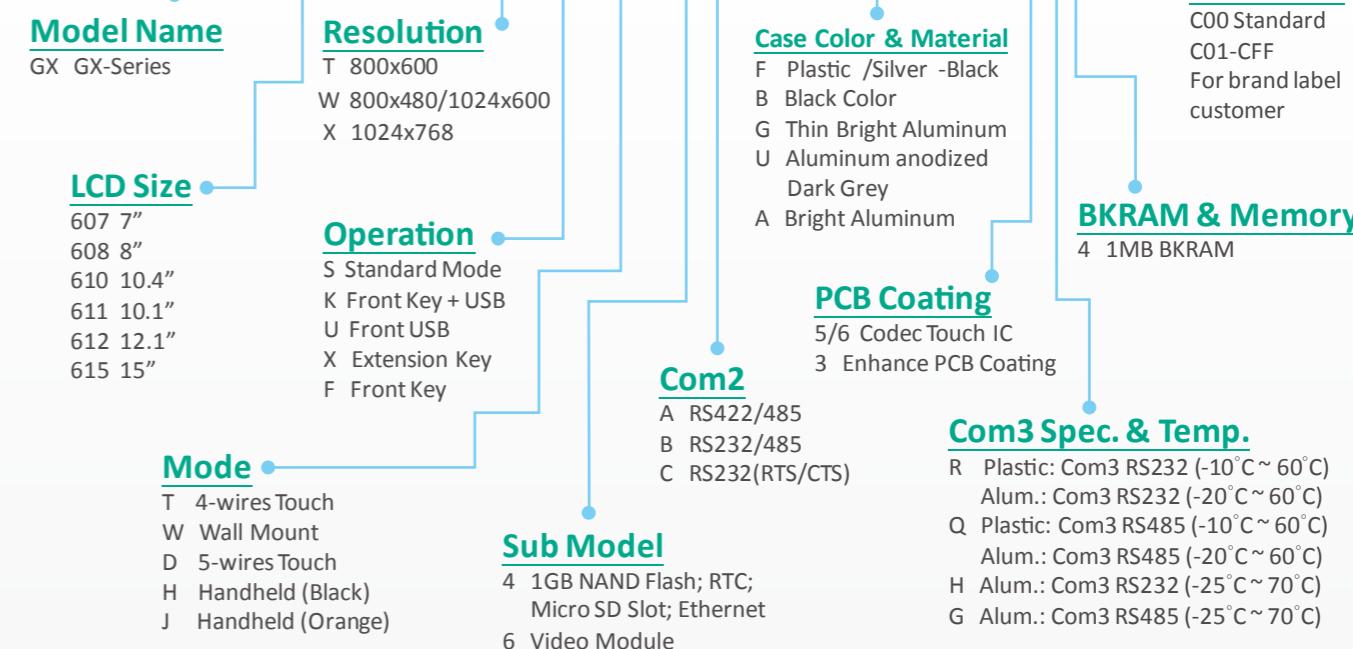
T-Series

PT 070 - W S T 4 B - F1 R1 C12



GX-Series

GX 612 - X S D 4 B - U 6 R 4 C00



PANEL EXPRESS

P2W - SPT - A 03 - 016 35 DRVBCS

